

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application:

1. (Currently Amended) A computer that is configured for connection to a network including the Internet, comprising:

a microchip including a microprocessor, said microprocessor including a master control unit and at least two processing units, the master control unit configured to control the processing units;

at least one Faraday Cage surrounding said microchip;

said microchip further including at least one inner firewall, located between the master control unit and [[the]] at least [[two]] one processing units unit, configured with hardware to make the master control unit and one of the processing units inaccessible from the network including the Internet when the computer is connected to the network including the Internet; and

said at least one inner firewall is further configured in a manner that permits access by another computer in the network including the Internet to at least one of the processing units of the microprocessor for an operation with said another computer in the network including the Internet when the computer is connected to the network including the Internet.

2. (Currently Amended) The computer of claim 94, wherein [[one]] an operating system of said computer includes at least two or more independent components, each component having its own inner firewall configured with hardware to make each said

component inaccessible from the network including the internet when the computer is connected to the network including the internet.

3. (Previously Presented) The computer of claim 94, wherein said microchip further includes at least one special purpose microprocessor.

4. (Previously Presented) The computer of claim 94, wherein said-microchip further includes

a random access memory (RAM);

an input; and

an output.

5. (Previously Presented) The computer of claim 94, wherein said Faraday Cage is configured to shield against magnetic flux, including high frequency flux.

6. (Previously Presented) The computer of claim 94, wherein said Faraday Cage is a continuous structure without holes.

7. (Previously Presented) The computer of claim 94, wherein said microchip is surrounded by at least two Faraday Cages.

8. (Cancelled)

9. (Cancelled)

10. (Currently Amended) A computer that is configured for connection to a network including the Internet, comprising:

a microchip including a microprocessor, said microprocessor including a master control unit that is configured using hardware and firmware and including at least two processing units, the master control unit further configured to control the processing units;

a Faraday Cage surrounding said microchip;

said microchip including at least two inner firewalls;

a first of said at least two inner firewalls, ~~located between the master control unit and a first one of the at least two processing units,~~ is configured with hardware to make the master control unit and a first one of the processing units inaccessible from the network including the Internet when the computer is connected to the network including the Internet; and

a second of said at least two inner firewalls, located between the master control unit and a second one of the at least two processing units, is configured with hardware to make the second one of the processing units of the microprocessor inaccessible from the network including the Internet when the computer is connected to the network including the Internet.

11. (Previously Presented) The computer of claim 94, wherein said firewall is configurable by a user of said computer or by at least one authorized local network administrator.

12. (Previously Presented) The computer of claim 11, wherein a change in said configuration of said firewall is made, at least in part, by using field-programmable gate arrays (FPGA's).

13. (Previously Presented) The computer of claim 11, wherein a change in said configuration of said firewall involves a motherboard.

14. (Previously Presented) The computer of claim 11, wherein a change in said configuration of said firewall involves a manual switch.

15. (Previously presented) The personal computer of claim 10, wherein said at least one firewall includes at least one hardware component.

16. (Previously Presented) The computer of claim 10, wherein at least one of said at least two firewalls includes a software component.

17. (Previously Presented) The computer of claim 10, wherein at least one of said at least two firewalls includes a firmware component.

18. (Previously Presented) The computer of claim 10, wherein said computer is configured in a manner such that an operation with another computer from the network including the Internet is initiated by a user of said computer.

19. (Previously Presented) The computer of claim 10, wherein said computer is configured in a manner such that an operation with another computer from the network including the Internet is initiated by said another computer.

20. (Previously Presented) The computer of claim 10, wherein said computer is configured in a manner such that at least a part of said computer is idled by a user of said computer.

21. (Previously Presented) The computer of claim 10, wherein said second firewall denies access at least temporarily to said at least one processing unit by another computer from said network including the Internet.

22. (Previously Presented) The computer of claim 10, wherein said second firewall allows access at least temporarily to said processing unit by another computer from said network including the Internet during an operation with said another computer from the network including the Internet.

23. (Cancelled)

24. (Previously Presented) The computer of claim 10, wherein said network including the Internet includes at least a World Wide Web.

25. (Previously Presented) The computer of claim 10, wherein said computer is connected to said network including the Internet by a network connection that includes an optical fiber connected directly to said computer.

26. (Previously Presented) The computer of claim 10, wherein said computer is configured for a dense wave division multiplexing (DWDM) network connection.

27. (Previously Presented) The computer of claim 10, wherein said computer is configured to function as one of a master and a slave in an operation with another computer from the network including the Internet.

28. (Cancelled)

29. (Previously Presented) The computer of claim 1, wherein said operation is parallel processing and/or multitasking.

30. (Previously Presented) The computer of claim 10, wherein said another computer is a personal computer connected via a peer-to-peer connection to said computer.

31. (Cancelled)

32. (Cancelled)

33. (Previously Presented) The computer of claim 10, wherein said microchip has at least four or eight or 16 or 32 or 64 or 128 or 256 or 512 or 1024 processing units.

34. (Currently Amended) The computer of claim 10, wherein the master control unit includes a said processing unit.

35. (Previously Presented) The computer of claim 10, wherein the master control unit includes a random access memory (RAM) that is configured to be inaccessible from the Internet when the computer is connected to the Internet.

36. (Previously Presented) The computer of claim 35, wherein the random access memory (RAM) is non-volatile.

37. (Previously Presented) The computer of claim 10, wherein said Faraday Cage is a continuous structure without holes.

38. (Previously Presented) The computer of claim 10, wherein said microchip is surrounded by at least two Faraday Cages.

39. (Previously Presented) The computer of claim 10, wherein said further includes an inner Faraday cage that surrounds only a portion of said microchip.

40. (Cancelled)

41. (Previously Presented) The computer of claim 10, wherein the microchip further includes a dynamic random access memory (DRAM) that is configured for connection to the Internet and for control by the master control unit.

42. (Previously Presented) The computer of claim 94, wherein said microchip further includes an inner Faraday cage that surrounds only a portion of said microchip.

43. (Previously Presented) The computer of claim 10, wherein said computer is configured for a wireless connection.

44. (Previously Presented) The computer of claim 43, wherein said wireless connection connects said computer to said network including the Internet.

45. (Previously Presented) The computer of claim 10, wherein a part of an operating system of said computer includes at least two separate components, each component having its own said firewall.

46. (Previously Presented) The computer of claim 10, wherein an application program of said computer includes at least two separate components, each component having its own said firewall.

47. (Previously Presented) The computer of claim 10, wherein a part of an application program of said computer includes at least two separate components, each component having its own said firewall.

48. (Previously Presented) The computer of claim 94, further including a volatile memory, said firewall is further configured to permit access to at least a portion of said volatile memory by the network including the Internet to provide a network-accessible portion of said volatile memory; and

wherein said master control unit is configured to interrupt power to said network-accessible portion of said volatile memory in order to erase all files in said network-accessible portion of said volatile memory.

49. (Previously Presented) The computer of claim 94, further including a non-volatile memory, said firewall is further configured to permit access to at least a portion of said non-volatile memory by the network including the Internet to provide a network-accessible portion of said non-volatile memory; and

wherein said master control unit is configured to overwrite all files in said network-accessible portion of said non-volatile memory to erase all files in said network-accessible portion of said non-volatile memory.

50. (Currently Amended) A computer that is configured for connection to a network including the Internet, comprising:

a microchip including a microprocessor, at least two inner firewalls and at least two memory components,

said microprocessor including a master control unit that is configured using hardware and firmware and including at least two processing units, the master control unit configured to control the processing units;

a Faraday Cage surrounding said microchip;

~~a first of at least two inner firewalls, located between the master control unit and a first of said at least two processing units,~~ is configured with hardware to make the master control unit, ~~said a first of said at least two processing units and a first of said at least two~~ memory components inaccessible from the network including the Internet when the computer is connected to the network including the Internet; and

a second of said at least two inner firewalls, located between the master control unit and a second of said at least two processing units, is configured with hardware to make the second of said at least two processing units and a second of said at least two memory components inaccessible from the network including the Internet when the computer is connected to the network including the Internet.

51. (Previously Presented) The computer of claim 50, wherein said second of said at least two firewalls is configured to deny access by a user of said computer to said second of said at least two memory components of said computer during an operation with another computer from the network including the Internet.

52. (Previously Presented) The computer of claim 50, wherein said first of said at least two memory components is at least one hard drive device.

53. (Previously Presented) The computer of claim 50, wherein said first of said at least two memory components is at least one flash memory device.

54. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is at least one flash memory device.

55. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is at least one volatile random access memory (RAM) device.

56. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is at least one hard drive device.

57. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is at least one read-only memory (ROM).

58. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is at least one read-only digital video disk drive (DVD-ROM) device.

59. (Previously Presented) The computer of claim 50, wherein said first of said at least two memory components includes a Basic Input Output System (BIOS).

60. (Previously Presented) The computer of claim 50, wherein the computer is configured so that a user of said computer retains preemptive control of at least said second memory component of said at least two memory components.

61. (Previously Presented) The computer of claim 50, wherein the computer is configured so that a user of said computer retains preemptive control of all components of said personal computer.

62. (Cancelled)

63. (Previously Presented) The computer of claim 50, wherein said computer is configured to function as a master in an operation with another computer in the network including the Internet.

64. (Previously Presented) The computer of claim 50, wherein said computer is configured to function as a slave in an operation with another computer in the network including the Internet.

65. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is a volatile memory component.

66. (Previously Presented) The computer of claim 50, wherein said first of said at least two memory components is a non-volatile memory component.

67. (Previously Presented) The computer of claim 66, wherein said non-volatile memory component is at least one of a magnetic random access memory (MRAM) component or an ovonic unified memory microchip.

68. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components duplicates a first of said at least two memory components.

69. (Previously Presented) The computer of claim 50, wherein said first of said at least two memory components is a read and write memory component.

70. (Previously Presented) The computer of claim 50, wherein said second of said at least two memory components is a read-only memory component.

71. (Previously Presented) The computer of claim 50, wherein at least one of each of a hardware component, software file and firmware file has its own said firewall.

72. (Previously Presented) The computer of claim 50, wherein at least two of a hardware component, a software file, or a firmware file are grouped exclusively together inside at least one said firewall.

73. (Currently Amended) A computer that is configured for connection to a network including the Internet, comprising:

a microchip including a microprocessor, at least two inner firewalls and at least two memory components,

said microprocessor including a master control unit that is configured using hardware and firmware and including at least two processing units, the master control unit configured to control the processing units;

a Faraday Cage surrounding said microchip;

a first of said at least two inner firewalls, ~~located between the master control unit and a first of said at least two memory components,~~ is configured with hardware to make the master control unit, one of the processing units, and [the] a first of said at least two memory components inaccessible from the network including the Internet when the computer is connected to the network including the Internet; and

a second of said at least two inner firewalls, located between the master control unit and a second of said at least two memory components, is configured with hardware to make the second of said at least two memory components inaccessible from the network including the Internet when the computer is connected to the network including the Internet.

74. (Cancelled)

75. (Cancelled)

76. (Previously Presented) The computer of claim 94, wherein a personal computer system is contained on said microchip.

77. (Previously Presented) The computer of claim 76, wherein said microchip includes more than one said microprocessor.

78. (Cancelled)

79. (Previously Presented) The computer of claim 94, wherein said computer is an appliance that includes at least one of a handheld personal digital assistant, a telephone, a pager, a television, a game, a videotape player/recorder, a video camera, a compact disk (CD) player/recorder, a digital video disk (DVD) player/recorder, a radio, a camera, a printer, a fax machine, and an automobile.

80. (Currently Amended) A computer that is configured for connection to a network including the Internet, comprising:

a microchip including a microprocessor, including a master control unit that is configured using hardware and firmware, at least two processing units and at least one inner firewall, the master control unit configured to control the processing units;

at least one photovoltaic cell located on said microchip; and

said at least one inner firewall, located between the master control unit and ~~the at~~
~~least two~~ one of the processing units, is configured with hardware to make the master
control unit and one of the processing units inaccessible from the network including the
Internet when the computer is connected to the network including the Internet.

81. (Previously Presented) The computer of claim 80, wherein

the at least one inner firewall is further configured in a manner that permits access by
another computer in the network including the Internet to at least one of the processing units
for an operation with said another computer in the network including the Internet when the
computer is connected to the network including the Internet.

82. (Currently Amended) A computer that is configured for connection to a network
including the Internet, comprising:

a microchip including a microprocessor, including a master control unit that is
configured using hardware and firmware, at least two processing units and at least one inner
firewall, the master control unit configured to control the processing units;

at least one photovoltaic cell located on said microchip; and

a Faraday Cage surrounding said microchip;

wherein said at least one firewall, located between the master control unit and ~~the at~~
~~least two~~ one of the processing units, is configured with hardware to make the master
control unit and one of the processing units inaccessible from the network including the
Internet when the computer is connected to the network including the Internet.

83. (Previously Presented) The computer of claim 82, wherein

the at least one inner firewall is further configured in a manner that permits access by another computer in the network including the Internet to at least one of the processing units for an operation with said another computer in the network including the Internet when the computer is connected to the network including the Internet.

84. (Previously Presented) The computer of claim 94, wherein said at least one inner firewall includes at least one hardware component;

the at least one inner firewall being configured to allow and/or deny access to portions of the microchip both to a user of the computer and to a user of the microchip from the network including the Internet during a shared use of the microchip.

85. (Previously Presented) The computer of claim 84, wherein the shared use comprises shared file resources and/or message passing.

86. (Previously Presented) The personal computer of claim 84, wherein the shared use includes unauthorized shared use, including intrusion by hackers from outside the computer.

87. (Previously Presented) The computer of claim 1, wherein the microchip is a personal computer and the master control unit is configured for receiving input from an individual user of the personal computer.

88. (Previously Presented) The computer of claim 1, wherein the computer is configured such that an individual computer user has preemptive control of use of the computer.

89. (Previously Presented) The computer of claim 50, wherein said Faraday Cage is a continuous structure without holes.

90. (Previously Presented) The computer of claim 50, wherein said microchip is surrounded by at least two Faraday Cages.

91. (Previously Presented) The computer of claim 50, wherein said microchip includes an inner Faraday cage that surrounds only a portion of said microchip.

92. (Previously Presented) The computer of claim 50, wherein said Faraday Cage is configured to shield against magnetic flux including high frequency flux.

93. (Previously Presented) The computer of claim 10, wherein said Faraday Cage is configured to shield against magnetic flux including high frequency flux.

94. (Currently Amended) The computer of claim 1, wherein the master control unit includes a said processing unit.

95. (Previously Presented) The computer of claim 94, wherein the master control unit includes a random access memory (RAM) that is configured to be inaccessible from the Internet when the computer is connected to the Internet.

96. (Previously Presented) The computer of claim 94, wherein the master control unit is further configured to control access to the computer by the network including the Internet for said operation when the computer is connected to the network including the Internet.

97. (Previously Presented) The computer of claim 94, wherein the master control unit is further configured to initiate, and control execution of, said operation with said at least one of the processing units of the microprocessor when the computer is connected to the network including the Internet.

98. (Previously Presented) The computer of claim 94, wherein the master control unit is further configured to permit execution of said operation as requested by said another computer with said at least one of the processing units of the microprocessor when the computer is connected to the network including the Internet.

99. (Previously Presented) The computer of claim 94, wherein the microprocessor is a general purpose microprocessor.

100. (Previously Presented) The computer of claim 1, wherein a wired connection to the computer includes one or more ferrite beads.

101. (Previously Presented) The computer of claim 1, wherein a wired connection to the computer is surrounded by a Faraday cage.

102. (Previously Presented) The computer of claim 1, wherein the computer includes an external antenna that includes one or more ferrite beads.

103. (Previously Presented) The computer of claim 1, wherein the computer is powered by one or more photovoltaic cells, one or more batteries, or one or more fuel cells, all of which are surrounded by Faraday cage.

104. (Previously Presented) The computer of claim 1, wherein the computer is powered by one or more batteries and said one or more batteries are configured to provide a connection to a power grid only when charging of said batteries is required.

105. (Previously Presented) The computer of claim 1, wherein the Faraday cage includes a heat sink.